REMARKS

Claims 1 and 2 have been objected to based on certain formal issues identified by the Examiner in paragraphs 1 and 2 of the Office Action. In response to these grounds of objection, Applicant has amended Claims 1 and 2 in the manner suggested by the Examiner. Accordingly, reconsideration and withdrawal of these grounds of objection are respectfully requested.

Claims 1-13 have been rejected under 35 U.S.C. §102(b) as anticipated by Pryor (U.S. Patent No. 5,380,978). However, for the reasons set forth hereinafter, Applicant respectfully submits that Claims 1-13 distinguish over Pryor, whether considered by itself, or in combination with other references.

The present invention is directed to a method of locating assembly points in a process for assembling large scale components, such as is found in the aircraft industry, at dock yards, or the like. The purpose of the invention is to provide a method by which assembly locations may be accurately marked, as noted at page 2, lines 4-5 of the specification. The accurate location of such assembly locations is particularly important in the aerospace industry, for example, where a high degree of precision is required in aircraft assembly. The invention achieves such a high degree of accuracy by means of a series of

geometrical calculations. In particular, the key calculation common to both claimed embodiments (Claims 1 and 2) is their derivation of a vector N that intersects perpendicularly with the surface of one of two parts that are to be assembled and passes through a measured assembly location on the other such part, as is now specifically recited in both Claims 1 and 2. This feature is neither taught nor suggested by Pryor. In addition, Applicant notes that the feature of "indicating the calculated assembly point on the surface of the first part", as recited in both Claims 1 and 2 is also missing in Pryor.

The Pryor patent discloses the use of a computer display to convey to an operator how far a point is from a desired location, as noted at Column 4, lines 12-24. It is not concerned with, and makes no provision for, indicating an assembly point on the surface of a part to be assembled. In this regard, it is noteworthy that Pryor is directed in particular to applications in the automotive industry, in which the required precision and the scale of the parts differ from that addressed by the present application. Along the same lines, it is also noteworthy that Pryor makes no reference to the problems of back drilling with which the current invention is concerned, as stated at page 1, paragraph 3 through page 2, paragraph 2 of the application. Accordingly, the method disclosed by Pryor is clearly unsuitable for use in an application requiring high precision in the assembly of large components, such as in the aircraft industry.

For example, at Column 24, lines 42-45, it is stated that when robot has brought a part into an "approximate position" such that, as stated at Column 24, lines 37-38, "the part [15] in contact or near contact" with another part to which it is to be joined, a spot weld is made. Any error resulting from such approximate positioning is corrected by further welds that serve to hold the part in place, albeit under stress.

The latter type of error is exactly that which the current invention seeks to avoid. As stated at page 2, lines 22-24 of the application, "the method of the present invention reduces the possibility of inaccurate drilling, or other fixing process, which might otherwise cause defects in the parts being fixed, or potentially caused them to be scrapped." It is the geometric calculation discussed hereinabove, which is recited in both Claims 1 and 2 and is not disclosed by Pryor, that allows this degree of accuracy to be achieved. The teaching of the current application is thus contrary to that of Pryor. Accordingly, Applicant respectfully submits that independent Claims 1 and 2 distinguish over Pryor.

In light of the foregoing remarks, this application should be in condition for allowance, and early passage of this case to issue is respectfully requested. If there are any questions regarding this amendment or the application in general,

a telephone call to the undersigned would be appreciated since this should expedite the prosecution of the application for all concerned.

If necessary to effect a timely response, this paper should be considered as a petition for an Extension of Time sufficient to effect a timely response, and please charge any deficiency in fees or credit any overpayments to Deposit Account No. 05-1323 (Docket #2101/50761).

Respectfully submitted,

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